(FILE 'HOME' ENTERED AT 21:55:18 ON 02 DEC 2008)

```
FILE 'MEDLINE, CAPLUS, BIOSIS, SCISEARCH, LIFESCI' ENTERED AT 21:55:45 ON
     02 DEC 2008
           5234 S (FORM? OR PRODUC? OR GENERAT?) (5A) (EMBRYOID (W) BOD? OR EB)
L1
L2
             76 S (AGITAT? OR ROCK? OR STIR?) (8A) STEM(W) CELL
L3
              7 S (AGITAT? OR ROCK? OR STIR?)(8A)(MULTIPOT? OR PLURIPOT?)(5A)CE
L4
             7 S L1 AND L2
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L53 DUP REM L3 (4 DUPLICATES REMOVED) 3 DUP REM L4 (4 DUPLICATES REMOVED) L6 L7 291 S SUSPENSION (6A) STEM (W) CELL

L8 56 S SUSPENSION(6A) (MULTIPOT? OR PLURIPOT?) (5A) CELL

L9 323 S L7 OR L8 L10 25 S L1 AND L9

18 DUP REM L10 (7 DUPLICATES REMOVED) L11

=> d au ti so pi 1-3 15

- L5ANSWER 1 OF 3 MEDLINE on STN DUPLICATE 1
- ΑU Fernandes A M; Fernandes T G; Diogo M M; da Silva C Lobato; Henrique D; Cabral J M S
- ΤI Mouse embryonic stem cell expansion in a microcarrier-based stirred culture system.
- Journal of biotechnology, (2007 Oct 31) Vol. 132, No. 2, pp. 227-36. SO Electronic Publication: 2007-06-07. Journal code: 8411927. ISSN: 0168-1656.
- ANSWER 2 OF 3 CAPLUS COPYRIGHT 2008 ACS on STN L5
- Kolossov, Eugen; Kettenhofen, Ralf; Kopp, Isabella; Bohlen, Heribert; ΤN Schwengberg, Silke
- Novel method for the preparation of embryoid bodies (ebs) and uses thereof ΤI SO

PCT Int. Appl. CODEN: PIXXD2

		CENT	KIND DATE				APPL	ICAT		DATE										
ΡI		WO 2005005621 WO 2005005621 W: AE, AG, AL,							,	WO 2	004-	EP75:	30		20040708					
					AM,	ΑT,	AU,	ΑZ,	BA,	BB,	BG,	BR,	BW,	BY,	BZ,	CA,	CH,			
			CN,	CO,	CR,	CU,	CZ,	DE,	DK,	DM,	DZ,	EC,	EE,	EG,	ES,	FI,	GB,	GD,		
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			SN,	TD,	TG															
	AU	AU 2004256209 CA 2558946 EP 1644486				A1		2005	0120		AU 2	004-	2562	09		2	0040	708		
	CA					A1		2005	0120	1	CA 2	004-	25589	946		20040708				
	EΡ					A2		2006	0412		EP 2	004-	7408	22		20040708				
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			ΙE,	SI,	FΙ,	RO,	CY,	TR,	BG,	CZ,	EE,	HU,	PL,	SK						
	US	· · · · · · · · · · · · · · · · · · ·						2008	0124		US 2007-594188						20070621			

- L5 ANSWER 3 OF 3 LIFESCI COPYRIGHT 2008 CSA on STN
- Li, Li; Arman, Esther; Ekblom, Peter; Edgar, David; Murray, Patricia; ΑIJ Lonai, Peter
- Distinct GATA6- and laminin-dependent mechanisms regulate endodermal and TΤ

ectodermal embryonic stem cell fates

SO Development, (20041101) vol. 131, no. 21, pp. 5277-5286. ISSN: 0950-1991.

=> d au ti so pi 1-3 16

L6 ANSWER 1 OF 3 MEDLINE on STN

DUPLICATE 1

- AU King James A; Miller William M
- TI Bioreactor development for stem cell expansion and controlled differentiation.
- SO Current opinion in chemical biology, (2007 Aug) Vol. 11, No. 4, pp. 394-8. Electronic Publication: 2007-07-25. Ref: 37
 Journal code: 9811312. ISSN: 1367-5931.
- L6 ANSWER 2 OF 3 CAPLUS COPYRIGHT 2008 ACS on STN
- AU Cameron, C. M.; Hu, Wei-Shou; Kaufman, Dan S.
- TI Improved development of human embryonic stem cell-derived embryoid bodies by stirred vessel cultivation
- SO Biotechnology and Bioengineering (2006), 94(5), 938-948 CODEN: BIBIAU; ISSN: 0006-3592
- L6 ANSWER 3 OF 3 CAPLUS COPYRIGHT 2008 ACS on STN
- AU Schroeder, Magnus; Niebruegge, Sylvia; Werner, Andreas; Willbold, Elmar; Burg, Monika; Ruediger, Manfred; Field, Loren J.; Lehmann, Juergen; Zweigerdt, Robert
- TI Differentiation and lineage selection of mouse embryonic stem cells in a stirred bench scale bioreactor with automated process control
- SO Biotechnology and Bioengineering (2005), 92(7), 920-933 CODEN: BIBIAU; ISSN: 0006-3592

=> d au ti so pi 1-18 l11

- L11 ANSWER 1 OF 18 MEDLINE on STN DUPLICATE 1
- AU Niebruegge Sylvia; Nehring Andrea; Bar Harald; Schroeder Magnus; Zweigerdt Robert; Lehmann Juergen
- TI Cardiomyocyte production in mass suspension culture: embryonic stem cells as a source for great amounts of functional cardiomyocytes.
- SO Tissue engineering. Part A, (2008 Oct) Vol. 14, No. 10, pp. 1591-601. Journal code: 101466659. ISSN: 1937-3341.
- L11 ANSWER 2 OF 18 BIOSIS COPYRIGHT (c) 2008 The Thomson Corporation on STN
- AU Anonymous; Okano, Hideyuki [Inventor]; Shimazaki, Takuya [Inventor]
- TI Process for producing nerve stem cells, motor neurons, and GABAergic neurons from embryonic stem cells.
- SO Official Gazette of the United States Patent and Trademark Office Patents, (NOV 13 2007)
 CODEN: OGUPE7. ISSN: 0098-1133.
- PI US 07294510 20071113
- L11 ANSWER 3 OF 18 CAPLUS COPYRIGHT 2008 ACS on STN
- AU Verma, V.; Gautam, S. K.; Singh, B.; Manik, R. S.; Palta, P.; Singla, S. K.; Goswami, S. L.; Chauhan, M. S.
- TI Isolation and characterization of embryonic stem cell-like cells from in vitro-produced buffalo (Bubalus bubalis) embryos
- SO Molecular Reproduction and Development (2007), 74(4), 520-529 CODEN: MREDEE; ISSN: 1040-452X
- L11 ANSWER 4 OF 18 CAPLUS COPYRIGHT 2008 ACS on STN

- zur Nieden, Nicole I.; Cormier, Jaymi T.; Rancourt, Derrick E.; Kallos, ΑU Michael S.
- ΤТ Embryonic stem cells remain highly pluripotent following long term expansion as aggregates in suspension bioreactors
- Journal of Biotechnology (2007), 129(3), 421-432 SO CODEN: JBITD4; ISSN: 0168-1656
- L11 ANSWER 5 OF 18 CAPLUS COPYRIGHT 2008 ACS on STN
- ΙN Tanaka, Noriaki; Kobayashi, Naoya
- Method for inducing differentiation of embryonic stem cells into ΤI hepatocytes, and applications of induced hepatocytes
- SO PCT Int. Appl., 44pp.

US 20080206733

CN 101233227

	CODEN: PIXXD2 PATENT NO.						D -	DATE			APPL	ICAT		DATE					
ΡI	WO	2006	0828	90		A1		2006	0810	,	WO 2	006-	JP30	1762		2	20060202		
		W:	ΑE,	AG,	AL,	AM,	ΑT,	ΑU,	ΑZ,	BA,	BB,	BG,	BR,	BW,	BY,	BZ,	CA,	CH,	
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			SG,	SK,	SL,	SM,	SY,	ТJ,	TM,	TN,	TR,	TT,	TZ,	UA,	UG,	US,	UZ,	VC,	
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			IS,	ΙΤ,	LT,	LU,	LV,	MC,	ΝL,	PL,	PT,	RO,	SE,	SI,	SK,	TR,	BF,	ВJ,	
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	ΕP	1842	905			A1		2007	1010		EP 2	006-	7129	05		20060202			
		R:	DE,	FR,	GB														

Α ANSWER 6 OF 18 CAPLUS COPYRIGHT 2008 ACS on STN L11

A1

- Cormier, Jaymi T.; Zur Nieden, Nicole I.; Rancourt, Derrick E.; Kallos, ΑU Michael S.
- ΤI Expansion of Undifferentiated Murine Embryonic Stem Cells as Aggregates in Suspension Culture Bioreactors

20080828 US 2007-883597

20080730 CN 2006-80006881

20070802

20070903

- SO Tissue Engineering (2006), 12(11), 3233-3245 CODEN: TIENFP; ISSN: 1076-3279
- L11 ANSWER 7 OF 18 CAPLUS COPYRIGHT 2008 ACS on STN
- ΑU Cameron, C. M.; Hu, Wei-Shou; Kaufman, Dan S.
- TΙ Improved development of human embryonic stem cell-derived embryoid bodies by stirred vessel cultivation
- Biotechnology and Bioengineering (2006), 94(5), 938-948 SO CODEN: BIBIAU; ISSN: 0006-3592
- L11 ANSWER 8 OF 18 MEDLINE on STN DUPLICATE 2
- Jiang Zhong-ming; Ji Pei-hong; Liu Jun; Tang Yue-jun; Li Sheng-jiao; Li ΑU Wen-lin
- Induction of mouse embryonic stem cells forming odontoblast-like cells by ΤI co-culture with pulp fibroblast.
- Shanghai kou qiang yi xue = Shanghai journal of stomatology, (2006 Dec) Vol. 15, No. 6, pp. 653-6. Journal code: 101090220. ISSN: 1006-7248.
- L11 ANSWER 9 OF 18 CAPLUS COPYRIGHT 2008 ACS on STN
- Sidhu, Kuldip S.; Tuch, Bernard E. ΑU
- Derivation of three clones from human embryonic stem cell lines by FACS TТ sorting and their characterization

- SO Stem Cells and Development (2006), 15(1), 61-69 CODEN: SCDTAE; ISSN: 1547-3287
- L11 ANSWER 10 OF 18 CAPLUS COPYRIGHT 2008 ACS on STN
- IN Barde, Yves-Alain; Bibel, Miriam; Richter, Jens; Tucker, Kerry Lee
- TI Differentiation of embryonic stem cells into neuronal precursors in the prescence of retinoic acid, and drug screening applications
- SO PCT Int. Appl., 71 pp.

CODEN: PIXXD2

		DEN: CENT				KIND DATE				APPL	ICAT		DATE						
ΡI		2005 2005				A2 A3				WO 2005-EP4886						20050504			
		W: AE, AG, CN, CO, GE, GH, LC, LK, NI, NO, SM, SY,		CR, GM, LR, NZ,	CU, HR, LS, OM,	CZ, HU, LT, PG,	DE, ID, LU, PH,	DK, IL, LV, PL,	DM, IN, MA, PT,	DZ, IS, MD, RO,	EC, JP, MG, RU,	EE, KE, MK, SC,	EG, KG, MN, SD,	ES, KM, MW, SE,	FI, KP, MX, SG,	GB, KR, MZ, SK,	GD, KZ, NA, SL,		
		RW:	AZ, EE, RO,	GH, BY, ES,	KG, FI, SI,	KZ, FR, SK,	MD, GB, TR,	MW, RU, GR, BF,	TJ, HU,	TM,	AT, IS,	BE,	BG, LT,	CH, LU,	CY, MC,	CZ, NL,	DE, PL,	DK, PT,	
		2005238202				A1		2005		AU 2005-238202						0050	504		
	CA	2563 1747	570			A1		20051110		CA 2005-2563570 EP 2005-741810						0050 0050			
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- L11 ANSWER 11 OF 18 CAPLUS COPYRIGHT 2008 ACS on STN
- IN Kolossov, Eugen; Kettenhofen, Ralf; Kopp, Isabella; Bohlen, Heribert; Schwengberg, Silke
- TI Novel method for the preparation of embryoid bodies (ebs) and uses thereof
- SO PCT Int. Appl.

CODEN: PIXXD2

		PATENT NO.					D	DATE			APPLICATION NO.						DATE			
ΡI					A2 A3		20050120 20050407			WO 2004-EP7530						20040708				
		W: RW:	CN, GE, LK, NO, TJ, BW, AZ, EE,	CO, GH, LR, NZ, TM, GH, BY, ES, SK,	CR, GM, LS, OM, TN, GM, KG, FI,	CU, HR, LT, PG, TR, KE, KZ,	CZ, HU, LU, PH, TT, LS, MD, GB,	AU, DE, ID, LV, PL, TZ, MW, RU, GR, CF,	DK, IL, MA, PT, UA, MZ, TJ, HU,	DM, IN, MD, RO, UG, NA, TM, IE,	DZ, IS, MG, RU, US, SD, AT, IT,	EC, JP, MK, SC, UZ, SL, BE, LU,	EE, KE, MN, SD, VC, SZ, BG, MC,	EG, KG, MW, SE, VN, TZ, CH, NL,	ES, KP, MX, SG, YU, UG, CY, PL,	FI, KR, MZ, SK, ZA, ZM, CZ, PT,	GB, KZ, NA, SL, ZM, ZW, DE, RO,	GD, LC, NI, SY, ZW AM, DK, SE,		
	AU	SN, TD, TG 2004256209				A1		2005	0120		AU 2004-256209						20040708			

- L11 ANSWER 12 OF 18 CAPLUS COPYRIGHT 2008 ACS on STN
- IN Gryseels, Timothy David; Hambor, John Edward; Hawrylik, Steven Joseph; Roach, Marsha Lynn
- TI Suspension method for producing embryoid bodies, and compositions and methods related thereto
- SO PCT Int. Appl., 91 pp.

		DEN: I	KIN	D	DATE APPLICATION NO.								DATE							
ΡI	WO	2004	 0399	 66		A1		20040513		•	——— WO 2	003-	IB46.	 39		20031020				
		W:	ΑE,	AG,	AL,	AM,	ΑT,	AU,	AZ,	BA,	BB,	BG,	BR,	BY,	BZ,	CA,	CH,	CN,		
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			BF,	ВJ,	CF,	CG,	CI,	CM,	GΑ,	GN,	GQ,	GW,	ML,	MR,	NE,	SN,	TD,	TG		
	ΑU	AU 2003269379					A1 20040525				AU 2	003-	21	20031020						
US 20040096967						A1		2004	0520		US 2	003-		20031031						

- L11 ANSWER 13 OF 18 CAPLUS COPYRIGHT 2008 ACS on STN
- IN Condie, Brian; Bieberich, Erhard
- TI Enrichment and production of human neural stem cells using ceramide analogs and MEDII conditioned medium, and PAR-4-mediated modulation of apoptosis, and therapeutic use
- SO PCT Int. Appl., 88 pp.

	CODEN: PIXXD2 PATENT NO.						D	DATE		APPLICATION NO.						DATE				
ΡI		2004 2004				A2 A3		2004 2005	0408		WO 2	003-		20030925						
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	US	2006	0014	280		A1		2006	0119		US 2	005-	5291	15		20050815				
	US 7445931					В2		20081104												

- L11 ANSWER 14 OF 18 CAPLUS COPYRIGHT 2008 ACS on STN
- IN Schulz, Thomas C.; Condie, Brian G.; Davidson, Bruce; Stice, Steven L.
- TI Neural differentiation of human pluripotent embryonic stem cells using serum free MEDII conditioned medium and use for neural disease treatment
- SO PCT Int. Appl., 88 pp.

CODEN: PIXXD2

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A2
                                        20040219
                                                      WO 2003-US24864
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      WO 2004015077
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      WO 2004015077
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                                     20040225 AU 2003-259072 20030808
20050601 EP 2003-785049 20030808
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                                A2
      EP 1534068
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      US 20060121607
                                        20060608 US 2005-524157 20050822
                                A 1
      ANSWER 15 OF 18 CAPLUS COPYRIGHT 2008 ACS on STN
L11
      Okano, Hideyuki; Shimazaki, Takuya; Nagao, Shogo; Matsumoto, Yoshito
IN
      Method for screening memory disorder treatment drug
ΤI
SO
      Jpn. Kokai Tokkyo Koho, 12 pp.
      CODEN: JKXXAF
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      PATENT NO.
                               KIND
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      JP 2004215565
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PΙ
      ANSWER 16 OF 18 CAPLUS COPYRIGHT 2008 ACS on STN
L11
      Davidson, Bruce Paul
ΤN
TT
      Production of neural progenitor cells from pluripotent cells
SO
      PCT Int. Appl., 74 pp.
      CODEN: PIXXD2
                                        DATE APPLICATION NO. DATE
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      WO 2003095629 A1 20031120 WO 2003-AU552 20030509
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      AU 2003221637 A1 20031111 AU 2003-221637 20030509
WO 2004015077 A2 20040219 WO 2003-US24864 20030808
      WO 2004015077
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                    A2
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                                     US 2005-514094
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                                                              20050627
US 20060121607
                           20060608
                                      US 2005-524157
                                                              20050822
                    Α1
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- L11 ANSWER 17 OF 18 MEDLINE on STN
- AU Sun L; Bradford C S; Barnes D W
- TI Feeder cell cultures for zebrafish embryonal cells in vitro.
- SO Molecular marine biology and biotechnology, (1995 Mar) Vol. 4, No. 1, pp. 43-50.

DUPLICATE 3

Journal code: 9205135. ISSN: 1053-6426.

- L11 ANSWER 18 OF 18 BIOSIS COPYRIGHT (c) 2008 The Thomson Corporation on STN
- AU Kioussi, Chrissa; Yamada, Gen [Reprint author]
- TI Double labeling of mRNA and protein markers in cultured embryoid bodies.
- SO Journal of Tissue Culture Methods, (1994) Vol. 16, No. 1, pp. 11-16. ISSN: 0271-8057.

=> d ab 12-18 111

- L11 ANSWER 12 OF 18 CAPLUS COPYRIGHT 2008 ACS on STN
- AB Suspension methods and compns. for effecting large-scale in vitro differentiation of mammalian embryonic stem cells are provided, as well as methods comprising the subject large-scale in vitro differentiation methods.
- L11 ANSWER 13 OF 18 CAPLUS COPYRIGHT 2008 ACS on STN
- AB The present invention provides compns. and methods for human neural cell production More particularly, the present invention provides cellular differentiation methods employing amphiphilic lipid compds., preferably ceramide analogs of the β -hydroxyalkylamine type and optionally employing an essentially serum free MEDII conditioned medium for the generation of human neural cells from pluripotent human cells. The methods alternatively comprise modulating apoptosis by modifying the levels of PAR-4, with or without the presence of amphiphilic lipid compds. and optionally employing MEDII conditioned medium. The methods alternatively encompass modulating apoptosis by modulating the intracellular concentration of endogenous lipid second messengers, such as ceramide. The neural cell of the invention can be used for therapy of a neural disease.
- L11 ANSWER 14 OF 18 CAPLUS COPYRIGHT 2008 ACS on STN
- AB The present invention provides compns. and methods for human neural cell production More particularly, the present invention provides cellular differentiation methods employing an essentially serum free MEDII conditioned medium, together with SSEA4 selection and protease passaging

techniques for the generation of human neural cells from pluripotent and multipotent human stem cells. Formation and characterization of embryoid bodies from human embryonic stem cells in serum-free conditions is shown. The invention provides a method of treating a patient with a neural disease by administering a therapeutically effective amount of the neural cells produced using the methods of the invention.

- L11 ANSWER 15 OF 18 CAPLUS COPYRIGHT 2008 ACS on STN
- AB A method is provided for screening a drug for memory disorder caused by Alzheimer disease or else. The method is characterized in that it comprises performing suspension culture of embryonic stem cells in the presence or absence of Noggin protein to form embryoid body, performing suspension culture of embryoid body in the presence of fibroblast growth factor and sonic hedgehog protein to make nerve stem cell proliferate, producing cholinergic neuron by differentiation in the presence of a test substance, and selecting the test substance effecting on differentiation/proliferation of cholinergic neuron. Alternatively, a test sample is added in the replacement of at least one kind from Noggin protein, fibroblast growth factor and sonic hedgehog protein.
- L11 ANSWER 16 OF 18 CAPLUS COPYRIGHT 2008 ACS on STN
- AB A method of producing neural progenitor cells and/or neuronal cells which method includes providing a source of pluripotent cells; a cell aggregate-inducing culture medium; and a neural inducing supplement; culturing the pluripotent cells in the cell aggregate-inducing culture medium, in the presence of the neural inducing supplement, for a period sufficient to permit cell aggregates or embryoid bodies (EB's) to form, wherein the EB's include neural progenitor cells; and culturing the cell aggregates including neural progenitor cells for a period sufficient to permit neuronal differentiation.
- L11 ANSWER 17 OF 18 MEDLINE on STN DUPLICATE 3
- AB Use of fibroblast cells derived from mouse embryos as feeder layers was one of the major steps leading to the establishment of pluripotential mouse embryonal stem (ES) cells in culture. In attempts to obtain a culture of pluripotential ES cells from zebrafish, a culture of fibroblastoid cells, designated zebrafish embryo fibroblast (ZEF), was established from early gastrula stage zebrafish embryos for use as feeder layer. In primary cultures initiated from early embryos of zebrafish without feeder layers, melanocytes appeared on the second day of culture. In contrast, melanogenesis was markedly suppressed in cocultures containing confluent monolayers of ZEF or Buffalo rat liver (BRL) cells. BRL cells are commonly used feeder layer cells for mouse ES cells. Suppression of melanogenesis was not observed in primary cultures initiated in medium containing human recombinant differentiation-inhibiting activity (DIA) or in medium conditioned by cultures of BRL feeder cells. Proliferation of zebrafish embryonal cells was enhanced significantly in cocultures with either feeder layer. Zebrafish embryonal cells cocultured short-term on ZEF and BRL feeder layers gave rise to melanocytes and formed embryoid body-like structures when removed from feeder layers and cultured in suspension, suggesting that the cells remained pluripotent in culture.
- L11 ANSWER 18 OF 18 BIOSIS COPYRIGHT (c) 2008 The Thomson Corporation on STN
- AB In vitro suspension cultures of embryonal carcinoma or embryonic stem cells (EC/ES) generate cell aggregates

termed as embryoid bodies (EBs). EBs have been analyzed to study the mechanisms of cellular differentiation in vitro. The multipotency of EC/ES cells to differentiate into various cell types as well as the expression of many marker genes provides a valuable in vitro model system to study the mechanisms of cellular differentiation. Here we present a procedure for a mRNA detection of a specific gene using double labeling-mRNA probe and an antibody against cellular marker proteins. This double labeling analysis in combination with a culture of EBs provides a useful approach to analyze several mechanisms of cellular differentiation from multipotent EC/ES cells.